

**Abstract of the Invention**

An integrated metal processing facility in which molten metal is poured into a series of molds at a pouring station to form metal castings, which are then transferred to a heat treatment line. Prior to introduction of the castings into a heat treatment station of the heat treatment line, the castings are subjected to heating sufficient to arrest cooling of the castings at or above a process control temperature for the metal thereof.

10051666-011802